



ARMY STRONG™

Exploring Redesign and Replacement of the

Mat Sinking Unit

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Commander,
Vicksburg District
March 2015



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US Army Corps of Engineers
BUILDING STRONG®



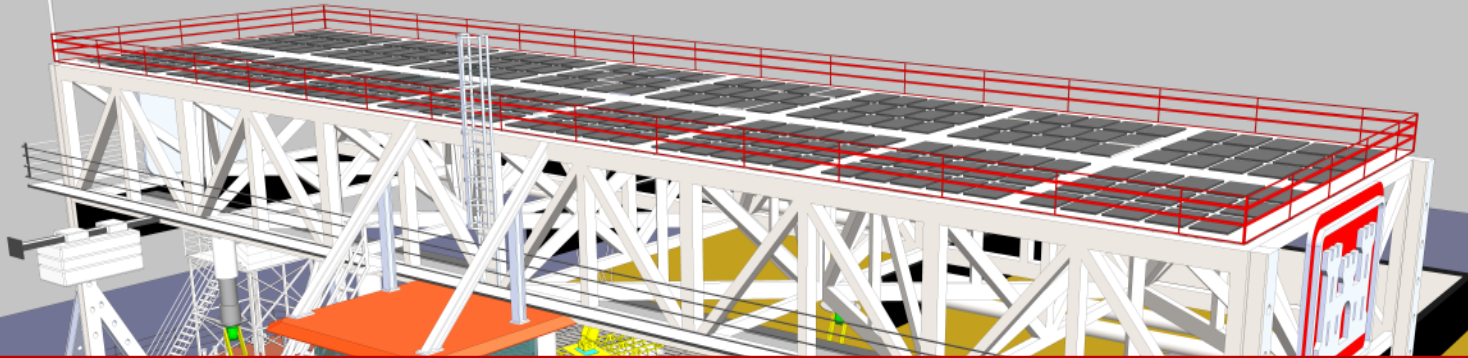
Mat Sinking Unit is Reaching the End of Its Effective Life



- Built in 1948
- Cost of mandatory repairs @ \$5-6M annu
- Numerous safety issues
- Spending money yearly in attempt to im
- safety
- No automation requires large amount of manual labor
- No warning sensors to indicate dangerous conditions nearby
- Webs of cabling required to operate



A New Revetment Machine Will...

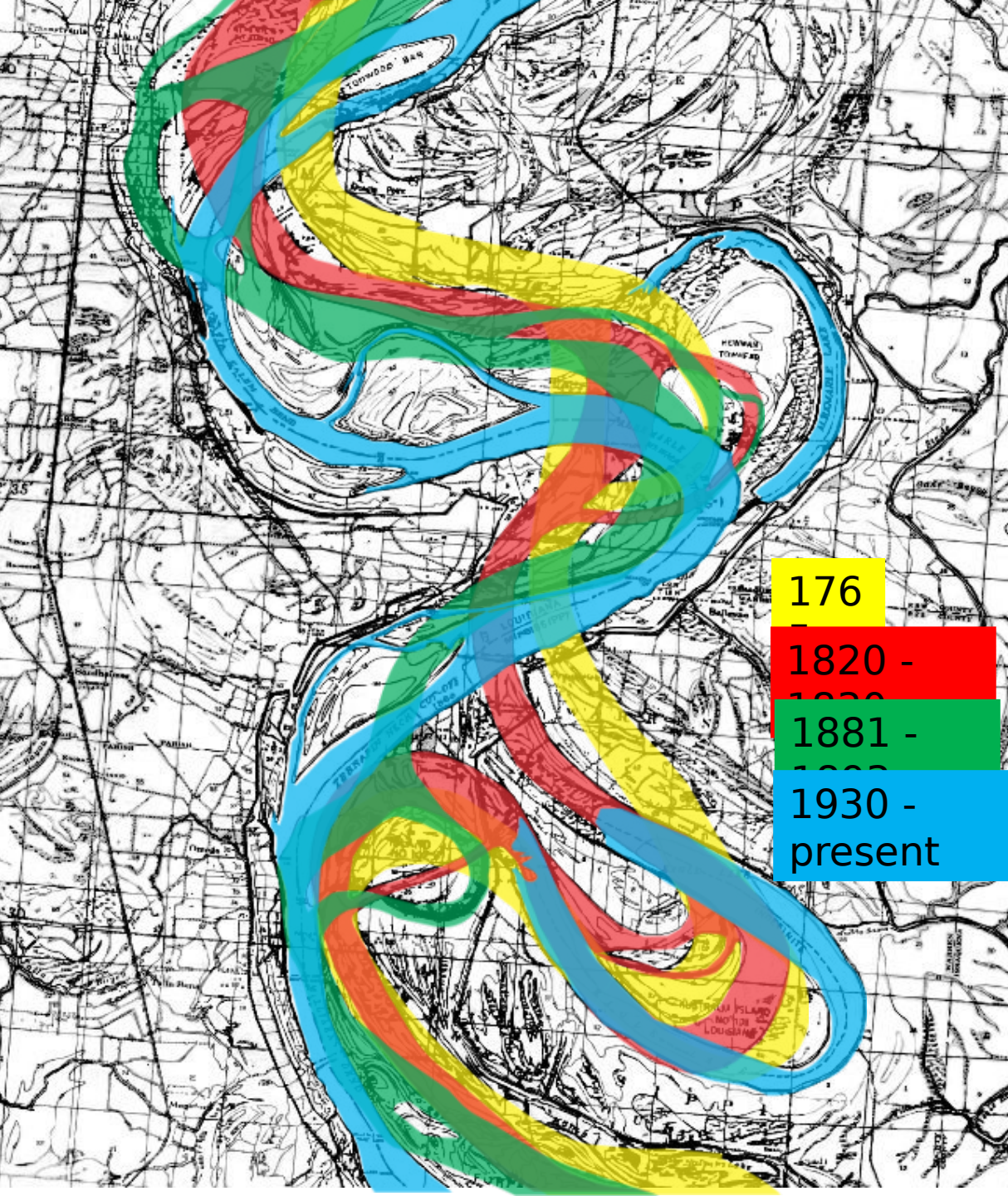


- Be more efficient and cost effective than current process
- Reduce the size of required associated plant
- Add higher paying technical jobs
- Reduce fuel consumption (carbon footprint)
- Reduce annual repair costs
- Have more automations and safer working environment
- Be more compact and mobile offering less channel restriction
- Allow armoring of the channel for the next 50 years

Controlling the Mighty Mississippi River

Without armoring, the River is a constantly attacking force capable of:

- *Cutting a new channel*
- *Breaching a levee system*
- *Destroying property and threatening populations*
- *Interrupting navigation and commerce*
- *Disrupting agricultural production*
- *Endangering natural habitats*



Earlier Methods of Stabilizing the Channel

"Weaved" Willow Mat



Placed Concrete Slabs

1939 - Wood and Stone Mat



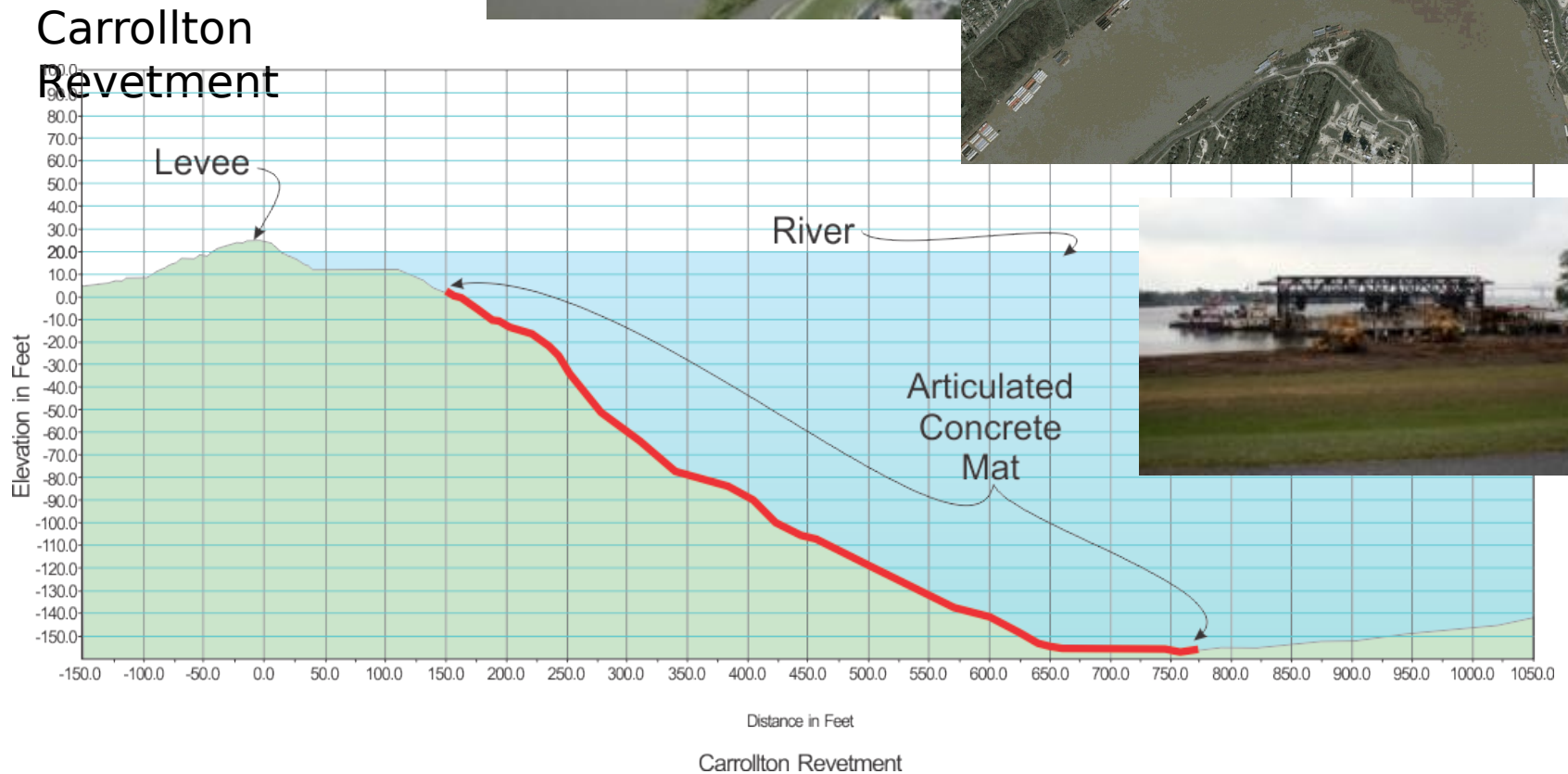
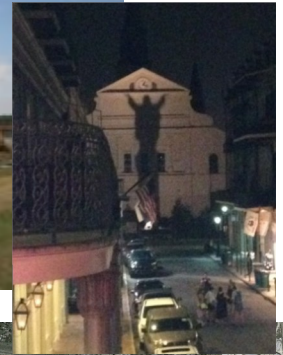
The Present Method....



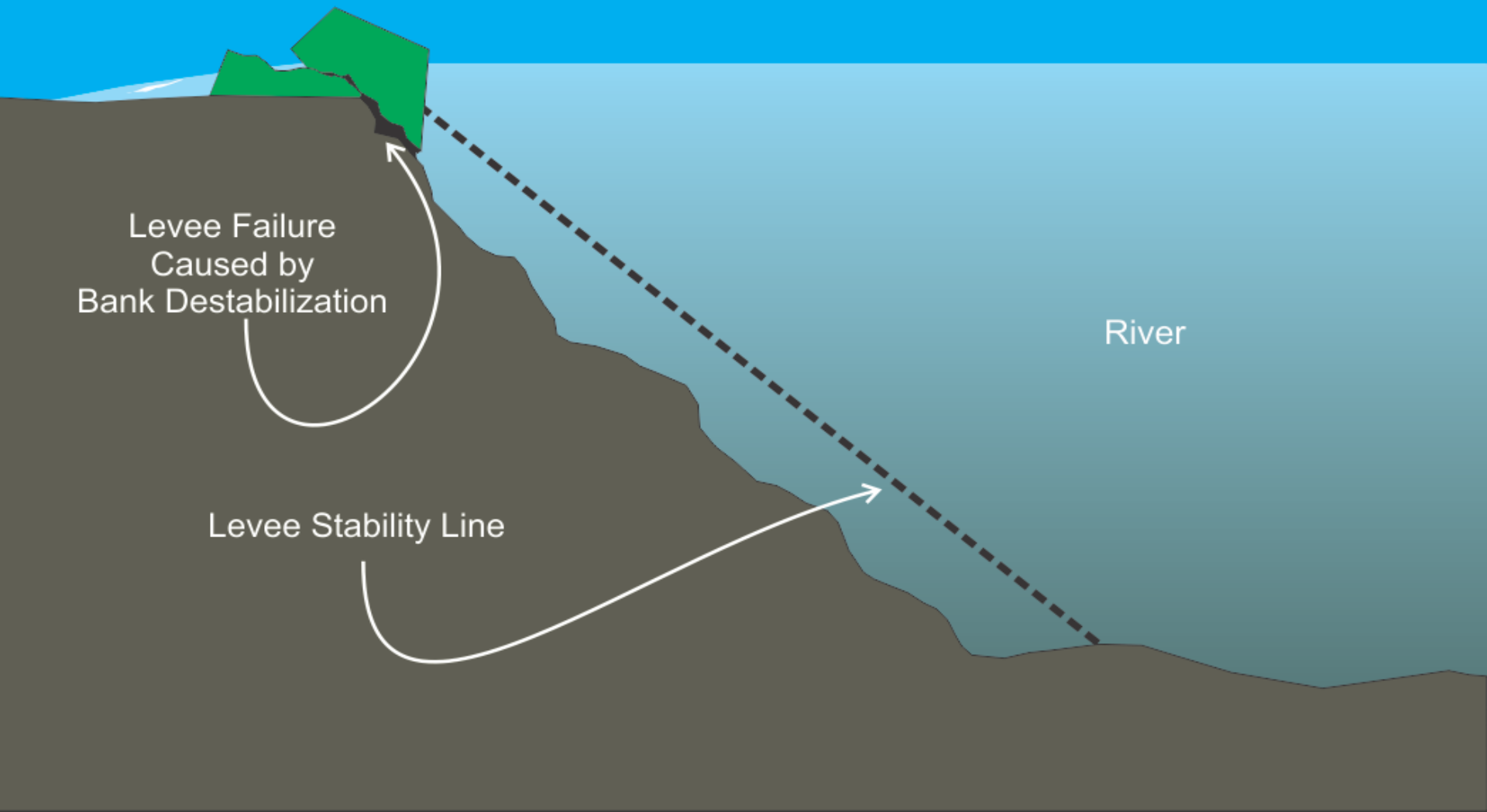


ARMORING THE RIVER *to Protect Commerce and Prevent Flooding*

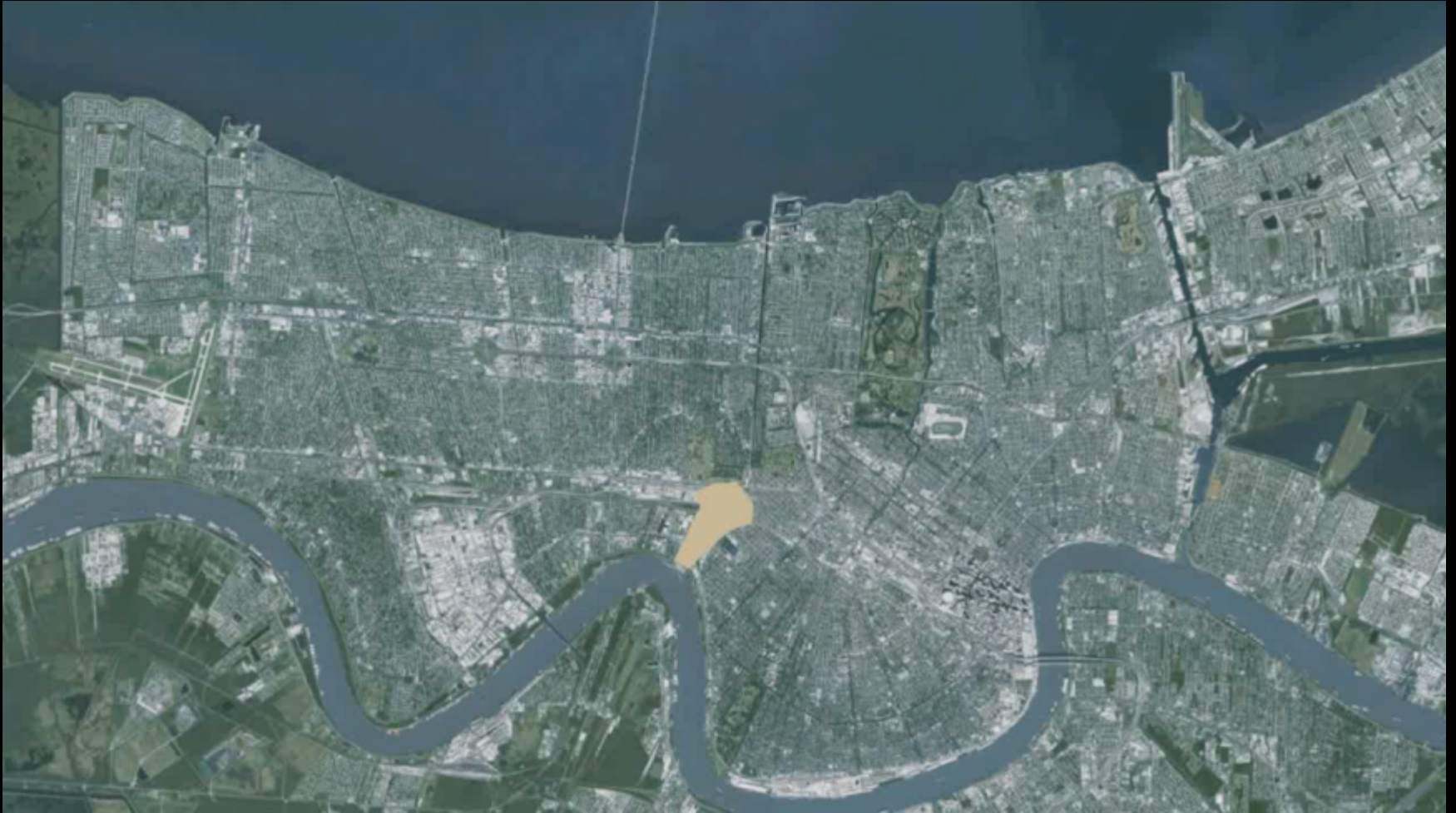
Protecting New Orleans



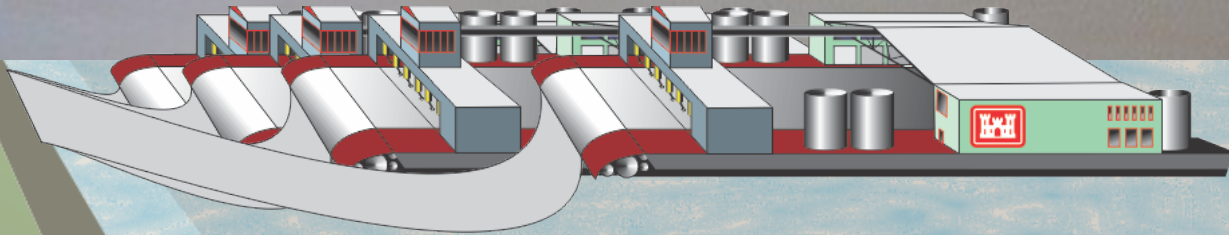
Levee Failure



ee Failure at New Orleans would be Catastrophe
...no time to react to rapidly spreading flood waters

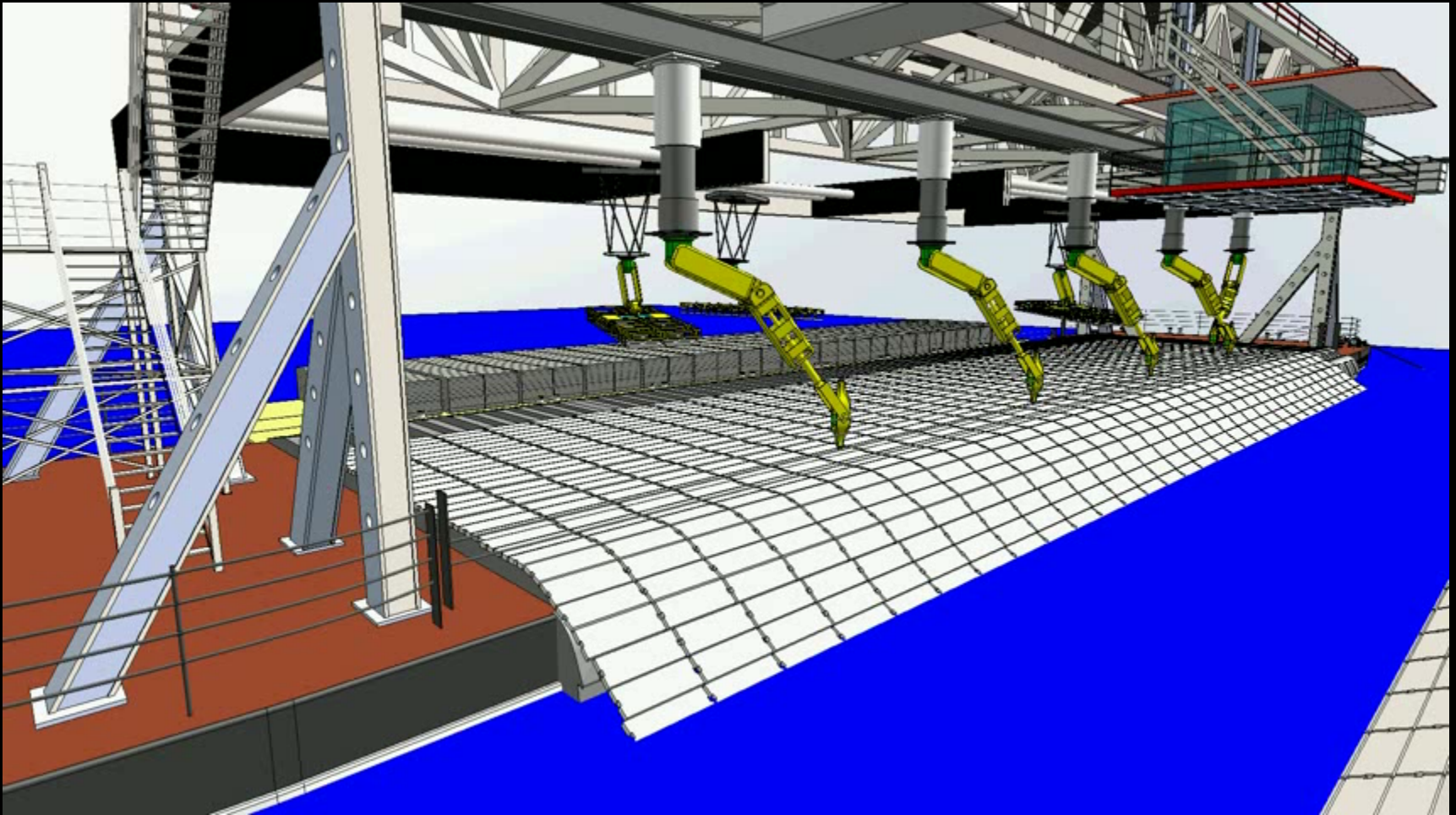


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or
***O*perational *N*avigation**
***E*nhancement**

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A New Beginning

The Timeline

